

Amendments to the Claims:

Claims 1 and 10 are canceled. Claims 6-9, 11, and 14-16 are withdrawn. Claim 21 is new.

This listing of claims will replace all prior versions and listings of claims in the application:

Listing of Claims

1. (cancelled)
2. (currently amended) The swivel adapter of claim 1 21 wherein the pivot surface is on a cylindrical boss and the center adapter has a split bore mountable over the cylindrical boss.
3. (previously presented) The swivel adapter of claim 2 wherein the clamp comprises:
 - a handle pivotally connected to the center adapter on one side of the split bore;
 - a rocker pivotally connected to the center adapter on an opposite side of the split bore;
 - a rod pivotally connected to the handle, the rocker and the rod operatively connected so as to span the split bore and also to define oppositely directed first and second shoulders; and
 - biasing means disposed between the first shoulder and the second shoulder for facilitating movement of the clamp operator from a clamped orientation to an unclamped orientation.
4. (previously presented) The swivel adapter of claim 3 wherein the rocker further comprises means for variably adjusting the biasing means, thereby to vary the force needed to move the clamp operator from clamped to unclamped.

5. (original) The swivel adapter of claim 4 wherein the biasing means comprises a plurality of Belleville springs.

6. (withdrawn) The swivel adapter of claim 1 further comprising:
 a threaded member extending in the outward direction beyond the pivot surface; and
 a knob disposed against a side of the center adapter and extending in the outward direction, the knob being engageable with the threaded member, whereby tightening the knob on the threaded member locks the center adapter against the base at a desired orientation and loosening the knob releases the center adapter to be pivotable on the pivot surface.

7. (withdrawn) The swivel adapter of claim 6 further comprising:
 a second device connector on the center adapter and facing the base; and
 a third device connector on the base and facing the second device connector, the second and third device connectors engaging in response to the knob being tightened, and the second and third device connectors disengaging in response to the knob being loosened.

8. (withdrawn) The swivel adapter of claim 7 wherein the first device connector, the second device connector and the third device connector are starburst connectors.

9. (withdrawn) The swivel adapter of claim 8 wherein the pivot surface is on a cylindrical boss and the center adapter has a bore mountable over the cylindrical boss.

10. (Canceled)

11. (withdrawn) The swivel adapter of claim 10 wherein the base, center adapter and clamp are made of radiolucent materials.

12. (currently amended) A swivel adapter connectable to, and extending outward from, a head support comprising:

a an elongated base having upper and lower ends comprising:

an outboard first side facing in an outward direction away from the swivel adapter and an inboard side facing in an inward direction, the inboard side including a connector for removably connecting a head support on the inboard side of the base, and

a pivot-surface boss extending from the first outboard side in the outward direction and having a pivot surface;

a center adapter mounted for pivoting motion on the pivot surface of the boss, and further comprising:

a split bore mountable for pivoting motion on the pivot surface formed therein and oriented perpendicular to the boss, and

a device connector facing in the outward direction, the device connector adapted to removably hold a device;

a clamp comprising

a handle pivotally connected to the center adapter on one side of the split bore,

a rocker pivotally connected to the center adapter on an opposite side of the split bore, and

a rod pivotally connected to the handle,

the rocker and the rod operatively connected so as to span the split bore and also to define oppositely directed first and second shoulders; and

a biasing means disposed between the first shoulder and the second shoulder for facilitating movement of the clamp operator from a clamped orientation to an unclamped orientation, the handle being operable to clamp the center adapter on the pivot surface of the boss at a desired orientation ~~with respect to the base~~, and to unclamp the center adapter from the pivot surface of the boss, thereby allowing the center adapter to rotate with respect to the ~~pivot surface~~ boss so as to locate the device connector at a desired rotated position relative to the boss.

13 (original) The swivel adapter of claim 12 wherein the biasing means is a plurality of Belville springs.

14. (withdrawn) A swivel adapter operable by a user comprising:

a base comprising

a first side facing in an outward direction away from the swivel adapter, and

a pivot surface extending from the first side in the outward direction;

a threaded member extending in the outward direction beyond the pivot surface;

a center adapter mountable for pivoting motion on the pivot surface and comprising

a first side extending in the outward direction and an opposite side facing the first side of the base,

a first device connector facing in the outward direction;

a knob disposed against the first side of the center adapter and engageable with the threaded member, whereby tightening the knob on the threaded member locks the center adapter against the base at a desired orientation and loosening the knob releases the center adapter to be pivotable on the pivot surface.

15 (withdrawn) The swivel adapter of claim 14 further comprising:

a second device connector on the base and facing in the outward direction; and

a third device connector on the center adapter and engageable with the second device connector upon the knob being tightened.

16. (withdrawn) The swivel adapter of claim 14 wherein the base, center adapter, and the knob are made of radiolucent materials so that the swivel adapter is radiolucent.

17. (currently amended) A base unit handle connectable to a shaft and a bar comprising:
a body having first and second split bores adapted to receive the shaft and the bar, respectively;
a clamping mechanism connected to the body and being operable to clamp and unclamp the first and second split bores on the respective shaft and bar, the clamping mechanism comprising:
a rod having one end connected to the body,
a closing handle pivotal about the body with respect to a fixed pivot point, and
a linkage connected between one end of the rod and one end of the closing handle and providing a mechanical advantage in transferring a force being applied from the closing handle to the rod, the linkage including a transfer link pivotally connected to the handle and a cam link pivotally connected to the rod, the transfer link and the cam link being pivotally interconnected.

18. (previously presented) The base unit handle of claim 17 wherein the linkage further comprises:
a transfer link having one end pivotally connected to the closing handle;
a cam link having
one end pivotally connected to an opposite end of the transfer link; and
an opposite end pivotally connected to the rod.

19. (currently amended) An apparatus connectable to a surgical table comprising:

a generally U-shaped frame having a crossbar and adapted to be connected to the surgical table;

~~a transitional arm having a shaft on one end;~~

a base unit handle comprising:

an elongated body having first and second ends, with a first split bore at the first end and connectable to the crossbar and a second split bore at the second end connectable to the shaft on the transition arm;

a transition arm having first and second ends, with a shaft at the first end adapted to be removably received within the second split bore;

a clamp clamping mechanism connected to the body of the base unit handle and being operable to apply a clamping force simultaneously to the first split bore and to the second split bore, the clamping mechanism comprising:

a cam rod having one end connected to the body at the first end thereof and extending across the first split bore and the second split bore,

a closing handle pivotally connected to the body about a fixed pivot point, the handle also operatively connected to the cam rod at the second end of the body, the handle being movable to an open position which permits rotatable movement of the body relative to the crossbar and relative to the shaft of the transition arm, at the first and second ends, respectively, and movable to a closed position which prevents rotation at the first and second ends, and

a linkage connected between ~~one end of the cam rod and one end of the closing handle at~~
the second end of the body and providing a mechanical advantage in transferring a force being
applied from the closing handle to the cam rod, thereby providing a greater clamping force
with the closing handle than would be produced without the linkage rod, the linkage including
a transfer link pivotally connected to the handle and a cam link pivotally connected to the rod,
the transfer link and the cam link being pivotally interconnected.

20. (currently amended) An apparatus for supporting a head support at one end of a table
comprising:

a swivel adapter of the type recited in claim 21; and operable by a user comprising:
a base having a first side facing in an outward direction away from the swivel adapter; and
a pivot surface extending from the first side in the outward direction;
a device connector adapted to be connected to the head support;
a center adapter mounted for pivoting motion on the pivot surface and having a first device
connector facing in the outward direction;
a clamp having a clamp operator operable
to clamp the center adapter on the pivot surface at a desired orientation with respect to
the base; and
unclamp the center adapter from the pivot surface; and
a sleeve adapter connected to a lower end of the base;

a transitional arm having an upper end connectable to the sleeve adapter and having a shaft on a lower end;

a generally U-shaped frame having a crossbar and adapted to be connected to the table; and

a base unit handle comprising:

a body having a first split bore connectable to the shaft of the transitional arm and a second split bore connectable to the crossbar,

a clamping mechanism connected to the body and being operable to clamp and unclamp the first split bore and the second split bore on the shaft and crossbar, respectively, the clamping mechanism comprising:

a rod having one end connected to the body,

a closing handle, and

a linkage connected between one end of the rod and one end of the closing handle and providing a mechanical advantage in transferring a force being applied from the closing handle to the rod.

21. (new) A swivel adapter comprising

an elongated base having first and second ends, the first end defining an outboard side facing in an outward direction and an inboard side facing in an inward direction;

a head support connection located at the inboard side of the first end of the base;

a boss extending outwardly from the outboard side of the base, the boss defining a pivot surface thereabout and a passage therethrough;

an adaptor with a cylindrically shaped opening sized to be mounted for pivoting motion on the pivot surface, the adapter having a first device connector facing in the outboard direction, the first device connector adapted to removably hold an additional device;

a handle operatively connected to the boss, the handle having an elongated shank extending through the cylindrically shaped opening of the adapter and also through the passage, the shank operable to cooperate with the head support connector to removably secure a head support to the inboard side of the base;

a clamp operatively connected to the adapter, the clamp including a clamp operator operable to clamp the center adapter on the pivot surface at a desired orientation with respect to the base, and to unclamp the center adapter from the pivot surface, thereby allowing the center adapter to rotate with respect to the pivot surface, the pivoting of the center adapter about the boss via the clamp operator being independent of the removable securement of a head support via the handle, with both the clamp operator and the handle being controllable from the outboard side of the base.